

The Commonwealth of Massachusetts
Executive Office of Health and Human Services
Department of Public Health
William A. Hinton State Laboratory Institute
305 South Street, Jamaica Plain, MA 02130

DEVAL L. PATRICK
GOVERNOR

TIMOTHY P. MURRAY
LIEUTENANT GOVERNOR

JUDYANN BIGBY, MD
SECRETARY

JOHN AUERBACH
COMMISSIONER

07/13/2011

Ryan Mingo
Assistant District Attorney, Suffolk County

Dear ADA Mingo,

Enclosed is the information you requested in regards to Commonwealth vs. [REDACTED]
Included are copies of the following:

1. Curriculum Vitae for Annie Dookhan and Daniela Frasca.
2. Drug Analysis Laboratory Receipt.
3. Control Cards with analytical results for samples # [REDACTED]
4. Analysis sheets with custodial chemist's hand notations and test results.
5. GC/Mass Spectral analytical data for samples # [REDACTED]

Daniela Frasca was the custodial chemist and performed the preliminary testing and net weight for this sample. Annie Dookhan was the confirmatory chemist and analyzed the GC/MS data for this sample.

If you have any questions about these materials, please call me at the number below.

Sincerely,

A handwritten signature in black ink, appearing to read "Annie Dookhan".

Annie Dookhan
Chemist II
Drug Analysis Lab
Jamaica Plain, MA. 02130
(617) 983-6631

Curriculum Vitae

Annie Khan (Dookhan)

Education:

University of Massachusetts, Boston, Ma, Master of Science in Chemistry.

University of Massachusetts, Boston, Ma, Bachelor of Science in Biochemistry.

Experience:

2003 – present

Chemist I, II, Massachusetts Department of Public Health, Drug Analysis Laboratory

*Completed six-week training course conducted by senior staff within the Department of Public Health, Drug Analysis Laboratory.

*Appointed Assistant Analyst by Assistant Commissioner of Public Health, 2004.

*Responsible for the identification of illicit drugs to determine violations of harmful and narcotic drug laws.

*Trained in the use of complex analytical instrumentation, microscopes and balances for the purpose of drug analysis.

*Maintenance and repairs of all analytical instruments.

*Responsible for the Quality Control of all analytical instruments, reagents and controls/standards.

*Responsible for the Quality Control/Quality Assurance program for the drug lab.

*Notary Public.

*Qualified as an expert witness in Massachusetts Courts and U.S. District Court

2001 – 2003

QC Analyst I, II, UMMS-Massachusetts Biologic Laboratory, QC Material Control

*Completed proficiency training conducted by a member of the staff within the MLB Quality Control and Quality Assurance Department.

*Method Development for creating new techniques and enhancing vaccines for the QC Dept. and FDA.

*Writing, revising and reviewing Standard Operating Procedures (SOPs).

*Trained and supervised new chemists and interns for the department.

*Routine QC testing of products for the FDA.

*Trained in the use of complex analytical instrumentation, and balances for the purpose of QC analysis for product and validation projects.

*Calibration, preventive maintenance, QC and QA of analytical instrumentation.

*Complete testing of chemicals for Vendor Validation Project for the FDA.

*Compendial testing and interpretation of the USP, ACS, FCC, AOAC, Merck Index, PDR, etc.

Additional Training:

Dept. of Justice – Forensics Professionals. (numerous trainings)

GLP/GMP course with Massachusetts Biologic Laboratory.

QC/QA training according to FDA Codes and Regulations.

GC and GC/MS courses with Agilent Technologies and Restek.

HPLC course with Waters Cooperation.

FTIR course with Spectros.

TOC training with MBL and Sievers.

Association:

American Chemical Society (ACS)

Northeastern Association of Forensics Science (NEAFS)

Curriculum Vitae

Daniela Frasca

Education

Boston University School of Medicine, Boston MA

Currently enrolled in the Biomedical Forensic Science MS Program

Suffolk University, Boston, MA

Graduated in 05/1996 and received a Bachelor of Science in Biochemistry

EXPERIENCE

Massachusetts State Laboratory Institute/DPH, Jamaica Plain, MA 01/2001 – present

Drug Laboratory: Chemist II

- Analysis of all substances by chemical screening, microscopy, and instrument confirmation to determine the presence of drugs for law enforcement agencies in the Commonwealth of Massachusetts.
- Appointed assistant analyst on January 29, 2001 by the Assistant Commissioner of DPH
- Completed four weeks of training in drug analysis under the supervision of senior chemists.

Quest Diagnostics Incorporated, Cambridge, MA

09/1996 – 10/2001

Department of Toxicology: Medical Technologist I

- Handles comprehensive toxic analysis, therapeutic drug monitoring, forensic drug screening, and compound ID's of biohazard samples utilizing standard operating procedures in clinical toxicology.
- Entered data and interpreted results for reporting
- QC/QA of multiple analytical instrumentation as well as maintenance
- Completed 60 days of training under the supervision of doctorate level toxicologists.

Additional Training

Northeastern Association of Forensic Scientists

Designer Drugs

Clandestine labs

Agilent Instruments and Software

Digital Photography

McCrone Research Institute

Forensic Polarized Microscopy

Polarized Microscopy of Illicit Drugs and Excipients

Massachusetts State Laboratory Institute

Expert Witness

Raman Spectroscopy

Associations and Programs

- Northeastern Association of Forensic Scientists (NEAFS) 2001 - present
- The International Association of Forensic Toxicologists (TIAFT) 2003 - present
- The International Association of Therapeutic Drug Monitoring And Clinical Toxicology (IATDMCT) 2003 - present
- Massachusetts State Science Fair Judge 2000 - present
- Middle School State Science Fair Judge 2006 - present
- Volunteer Science Project Mentor/Tutor for the TTT Mentor Program 2003 - present

DRUG RECEIPT

CC #

BOOK #

PAGE #

DESTRUCTION #

District/Unit

Name & Rank of Arresting Officer

ID#

DEFENDANT'S NAME

ADDRESS

CITY

STATE

DESCRIPTION OF ITEMS SUBMITTED

GROSS
QUANTITYGROSS
WEIGHT

LAB USE ONLY

ANALYSIS
NUMBER

Heroin

2 P/B^s

2.57g

Plastic STRAW (Heroin)

1

0.59g

Heroin

1 P.B.
Broken

1.82g

~~MARIJUANA~~~~1 P/B = marijuana~~

To be completed by ECU personnel only

Name and Rank of Submitting Officer

ID#

Received by

Date

ECU Control #

No. [REDACTED] Date Analyzed: 06-30-11
City: Boston D.C.U. Police
Officer: P.O. Diana Lopez

Pack: [REDACTED]
Amount: Subst. SUB
Net Cont: 1 Cont. pk

Date Rec'd: 06/27/2011 No. Analyzed: 1 analyzed

Gross Wt: 2.570 Net Wt: 2.08g
#Tests: 5
• 2930 (MMA)

Prelim: Heroin Findings: Heroin

No. [REDACTED] Date Analyzed: 6/28/11 ✓
City: Boston D.C.U. Police
Officer: P.O. Diana Lopez

Pack: [REDACTED]
Amount: Subst. RES
Net Cont: 1 Cont. straw

Date Rec'd: 06/27/2011 No. Analyzed:

Gross Wt: 3.590 Net Wt:
#Tests:

Prelim: Findings: Not Tested (MMA)

No. [REDACTED] Date Analyzed: 06-30-11
City: Boston D.C.U. Police
Officer: P.O. Diana Lopez

Pack: [REDACTED]
Amount: Subst. SUB
Net Cont: 1 Cont. pk

Date Rec'd: 06/27/2011 No. Analyzed:

Gross Wt: 1.020 Net Wt: 9.04g
#Tests: 5
2930 (MMA)

Prelim: Heroin Findings: Heroin

DRUG POWDER ANALYSIS FORM

SAMPLE #



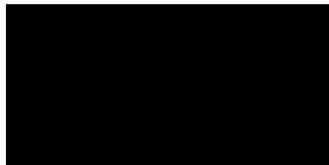
AGENCY

Boston

ANALYST

DM

PHYSICAL DESCRIPTION:



- Not Tested Ev. mark
- Tested

Powder in 2 PB

Marg +

Pract +

Meck +

Cobalt + blue specks

Gross wt. 0.6063g
(double bagged)

Gross wt of
1 analyzed: 0.3178g

Net wt of
1 analyzed: 0.0891g

PRELIMINARY TEST RESULTS

RESULTS

Heroin

DATE

6/28/11

GC/MS CONFIRMATORY TEST

RESULTS

Heroin

MS

OPERATOR

ASD

DATE

6/30/11

DRUG POWDER ANALYSIS FORM

SAMPLE #



AGENCY

Boston

ANALYST

DND

PHYSICAL DESCRIPTION:

Biaazard

a torn open PB
with debris

EV. MOK



- Tested
- Not tested

Powder in 1 ~~labeled~~-torn open PB

Marg +

Gross wt. 0.2356g

Preed +

Meck +

Net wt. 0.0443g

Cobalt + blue specks

PRELIMINARY TEST RESULTS

RESULTS

Heroin

DATE

6/28/11

GC/MS CONFIRMATORY TEST

RESULTS

Heroin

MS

OPERATOR

ASD

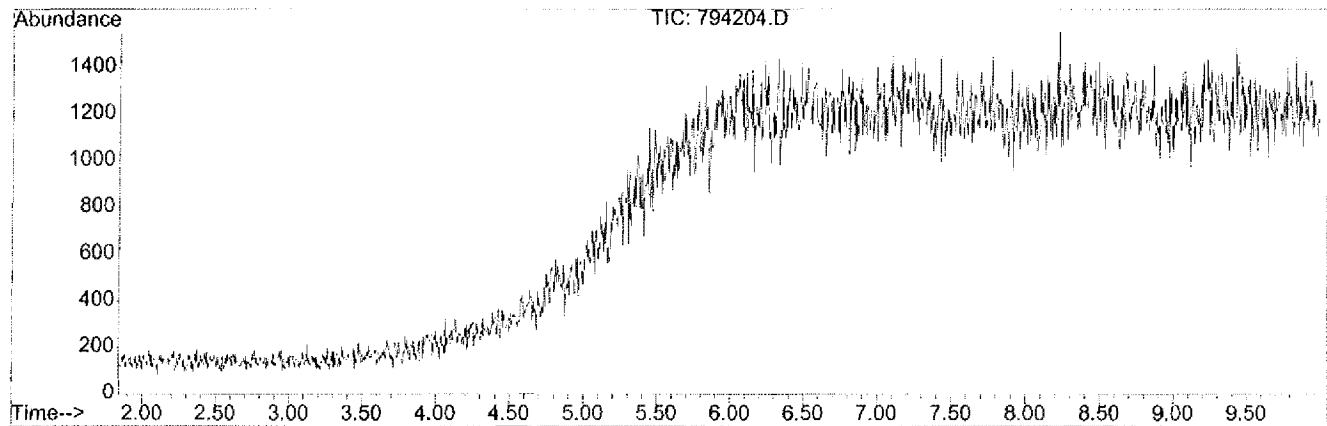
DATE

6/30/11

Area Percent / Library Search Report

Information from Data File:

File Name : F:\SYSTEM7\06_29_11\794204.D
Operator : ASD
Date Acquired : 29 Jun 2011 8:04
Sample Name : BLANK
Submitted by :
Vial Number : 1
AcquisitionMeth: DRUGS
Integrator : RTE



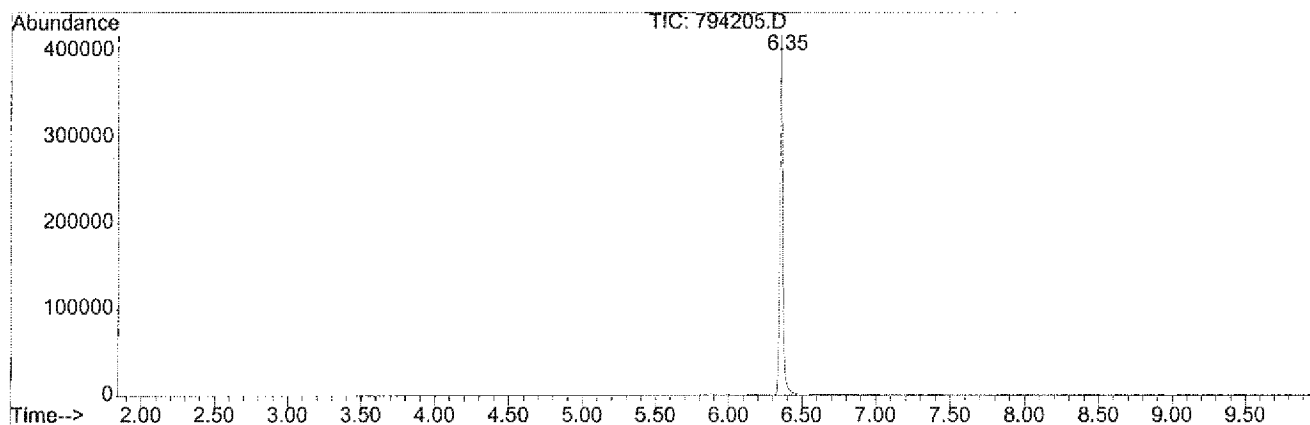
Ret. Time	Area	Area %	Ratio %
-----------	------	--------	---------

NO INTEGRATED PEAKS

Area Percent / Library Search Report

Information from Data File:

File Name : F:\SYSTEM7\06_29_11\794205.D
 Operator : ASD
 Date Acquired : 29 Jun 2011 8:17
 Sample Name : HEROIN STD
 Submitted by :
 Vial Number : 5
 AcquisitionMeth: DRUGS
 Integrator : RTE



Ret. Time	Area	Area %	Ratio %
6.354	573297	100.00	100.00

Area Percent / Library Search Report

Information from Data File:

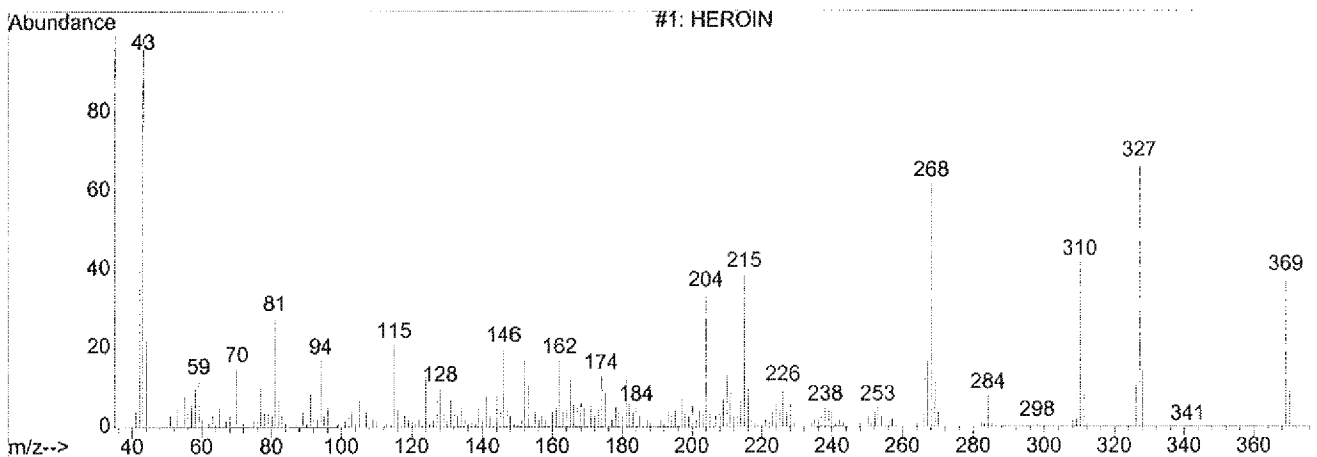
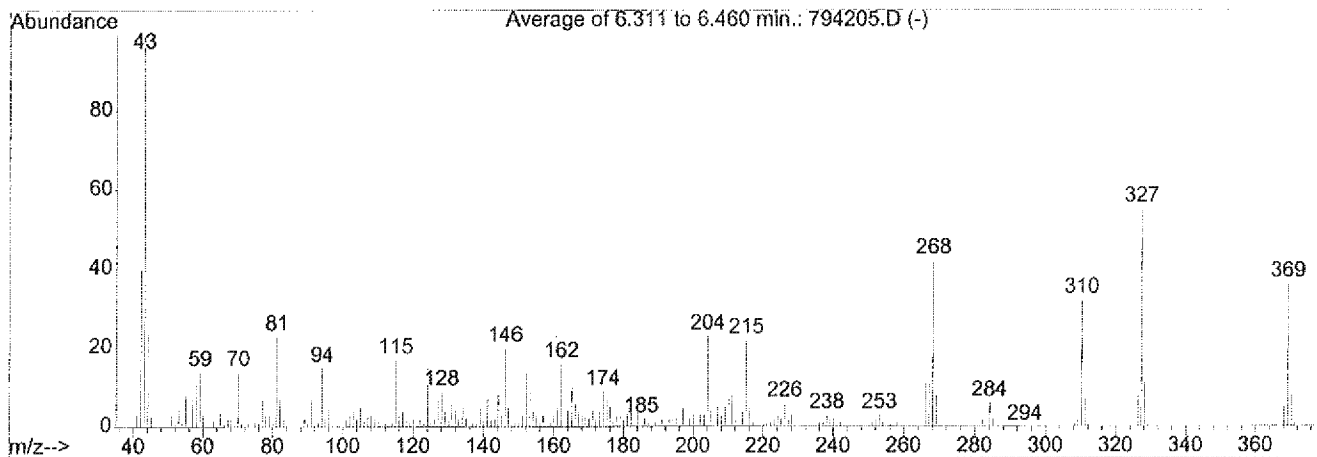
```

File Name       : F:\SYSTEM7\06_29_11\794205.D
Operator        : ASD
Date Acquired   : 29 Jun 2011   8:17
Sample Name     : HEROIN STD
Submitted by    :
Vial Number     : 5
AcquisitionMeth : DRUGS
Integrator      : RTE
  
```

```

Search Libraries: C:\DATABASE\SLI.L           Minimum Quality: 90
                  C:\DATABASE\PMW_TOX2.L      Minimum Quality: 90
                  C:\DATABASE\NIST98.L
  
```

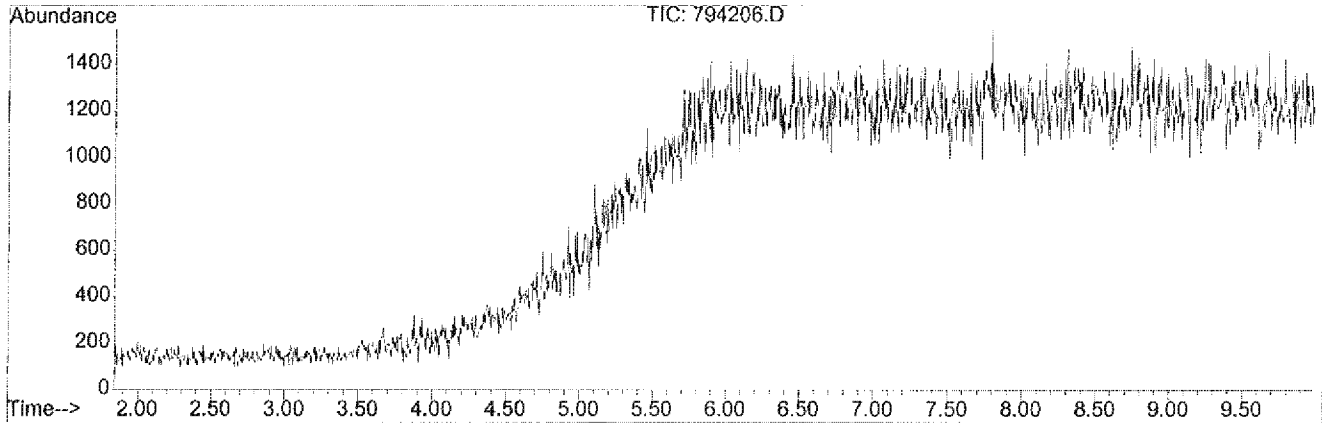
PK#	RT	Library/ID	CAS#	Qual
1	6.35	C:\DATABASE\SLI.L HEROIN	000561-27-3	99



Area Percent / Library Search Report

Information from Data File:

File Name : F:\SYSTEM7\06_29_11\794206.D
Operator : ASD
Date Acquired : 29 Jun 2011 8:29
Sample Name : BLANK
Submitted by : DXF
Vial Number : 1
AcquisitionMeth: DRUGS
Integrator : RTE



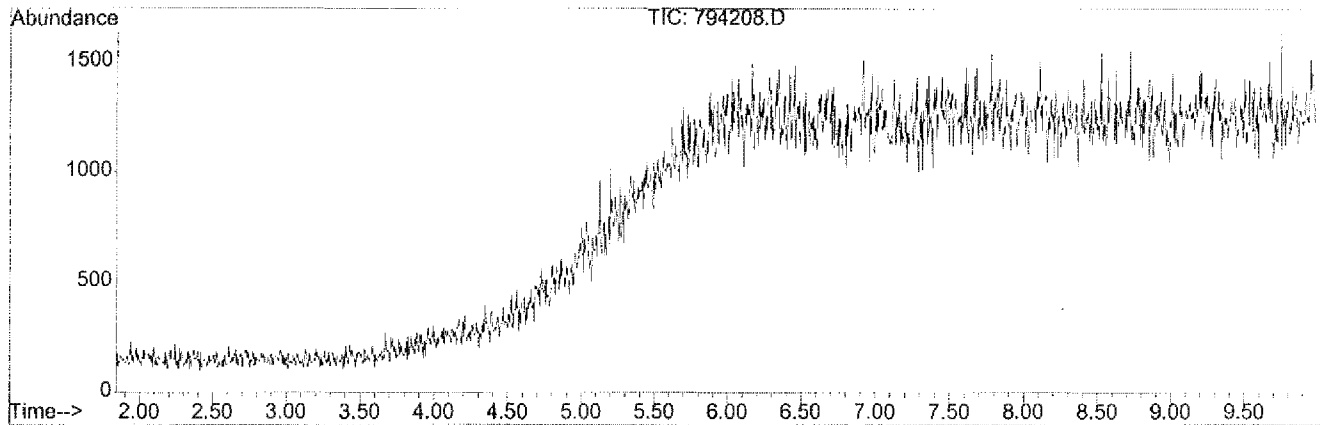
Ret. Time	Area	Area %	Ratio %
-----------	------	--------	---------

NO INTEGRATED PEAKS

Area Percent / Library Search Report

Information from Data File:

File Name : F:\SYSTEM7\06_29_11\794208.D
Operator : ASD
Date Acquired : 29 Jun 2011 8:55
Sample Name : BLANK
Submitted by : DXF
Vial Number : 1
AcquisitionMeth: DRUGS
Integrator : RTE



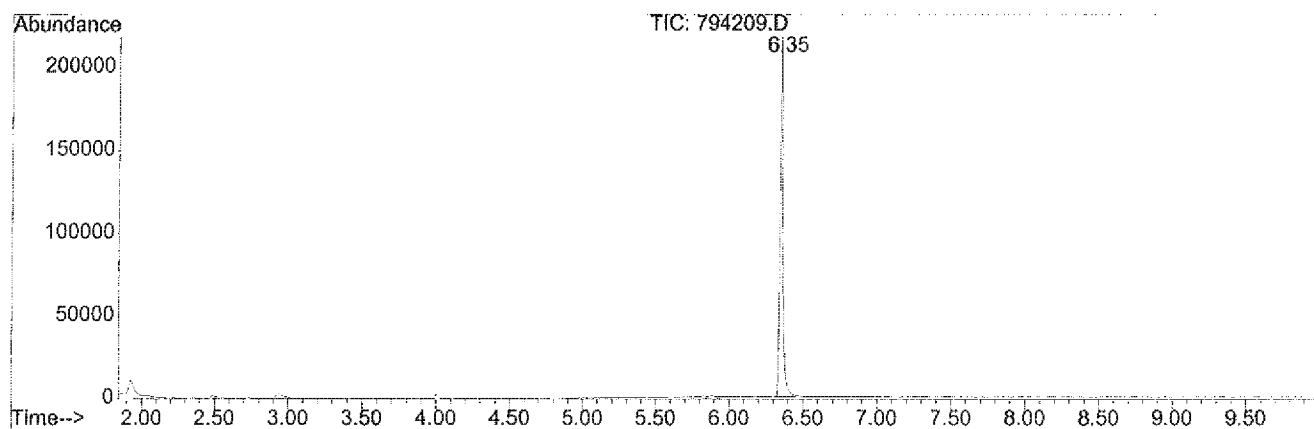
Ret. Time	Area	Area %	Ratio %
-----------	------	--------	---------

NO INTEGRATED PEAKS

Area Percent / Library Search Report

Information from Data File:

File Name : F:\SYSTEM7\06_29_11\794209.D
 Operator : ASD
 Date Acquired : 29 Jun 2011 9:07
 Sample Name : XXXXXXXXXX
 Submitted by : DXF
 Vial Number : 9
 AcquisitionMeth: DRUGS
 Integrator : RTE



Ret. Time	Area	Area %	Ratio %
6.348	306713	100.00	100.00

Area Percent / Library Search Report

Information from Data File:

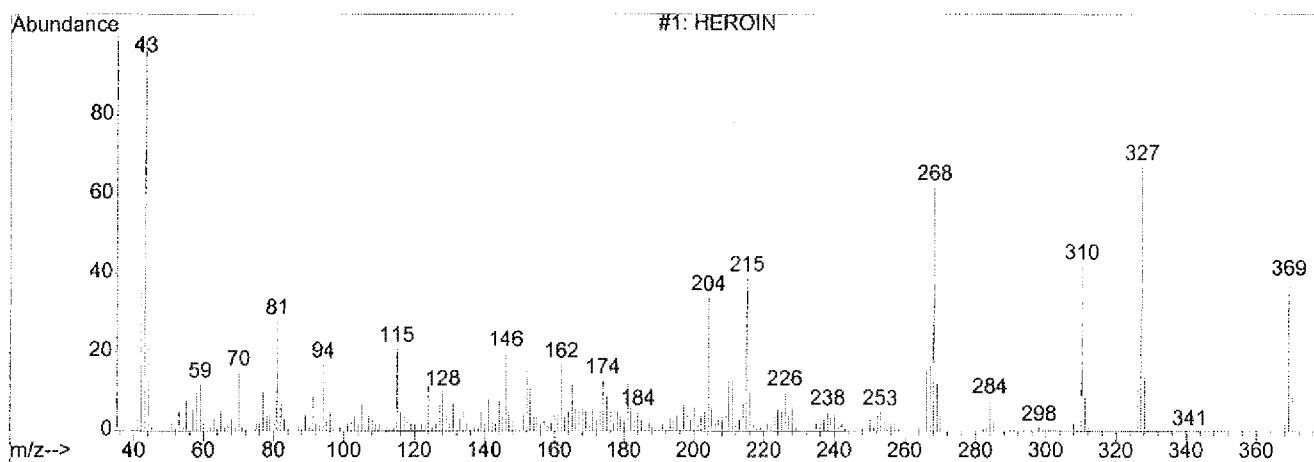
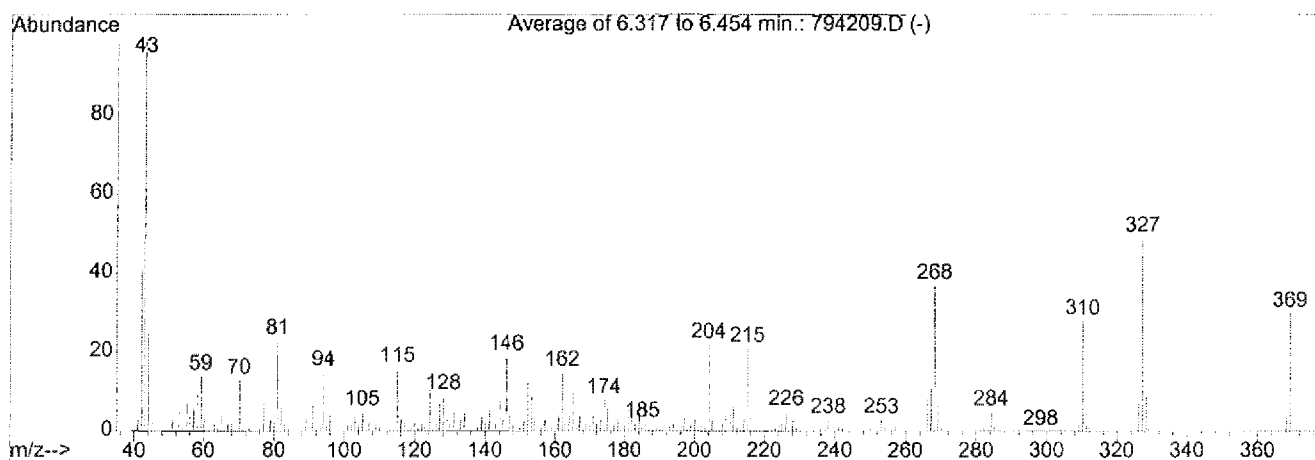
```

File Name       : F:\SYSTEM7\06_29_11\794209.D
Operator        : ASD
Date Acquired   : 29 Jun 2011   9:07
Sample Name     : 
Submitted by    : DXF
Vial Number     : 9
AcquisitionMeth : DRUGS
Integrator      : RTE
  
```

```

Search Libraries: C:\DATABASE\SLI.L           Minimum Quality: 90
                  C:\DATABASE\PMW_TOX2.L      Minimum Quality: 90
                  C:\DATABASE\NIST98.L
  
```

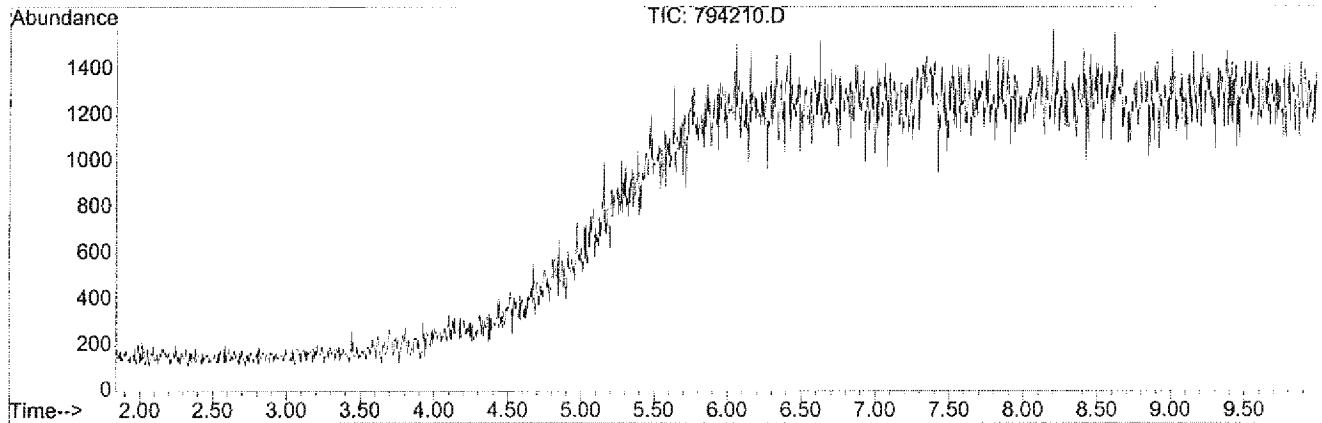
PK#	RT	Library/ID	CAS#	Qual
1	6.35	C:\DATABASE\SLI.L HEROIN	000561-27-3	99



Area Percent / Library Search Report

Information from Data File:

File Name : F:\SYSTEM7\06_29_11\794210.D
Operator : ASD
Date Acquired : 29 Jun 2011 9:20
Sample Name : BLANK
Submitted by : DXF
Vial Number : 1
AcquisitionMeth: DRUGS
Integrator : RTE



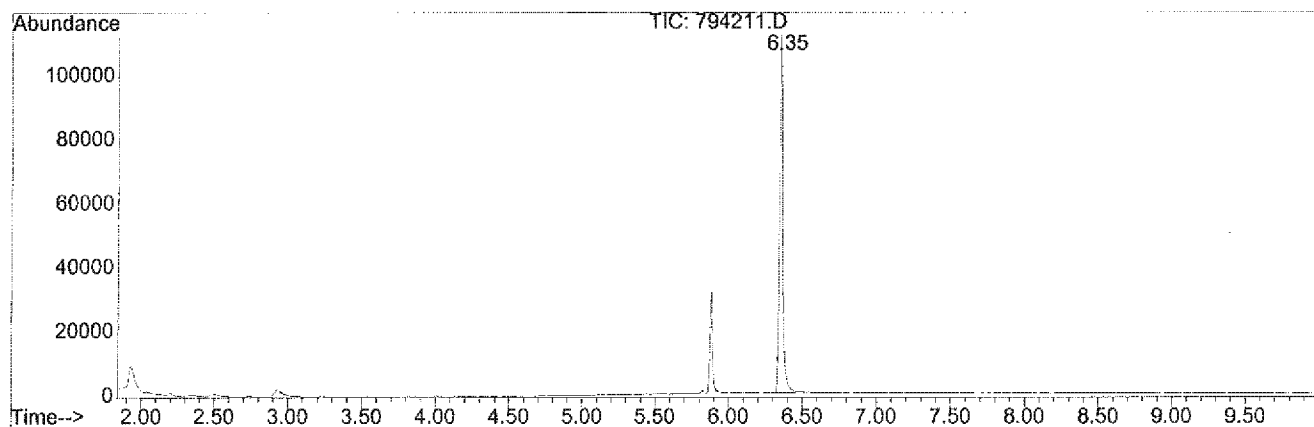
Ret. Time	Area	Area %	Ratio %
-----------	------	--------	---------

NO INTEGRATED PEAKS

Area Percent / Library Search Report

Information from Data File:

File Name : F:\SYSTEM7\06_29_11\794211.D
 Operator : ASD
 Date Acquired : 29 Jun 2011 9:33
 Sample Name : XXXXXXXXXX
 Submitted by : DXF
 Vial Number : 11
 AcquisitionMeth: DRUGS
 Integrator : RTE



Ret. Time	Area	Area %	Ratio %
6.348	168871	100.00	100.00

Area Percent / Library Search Report

Information from Data File:

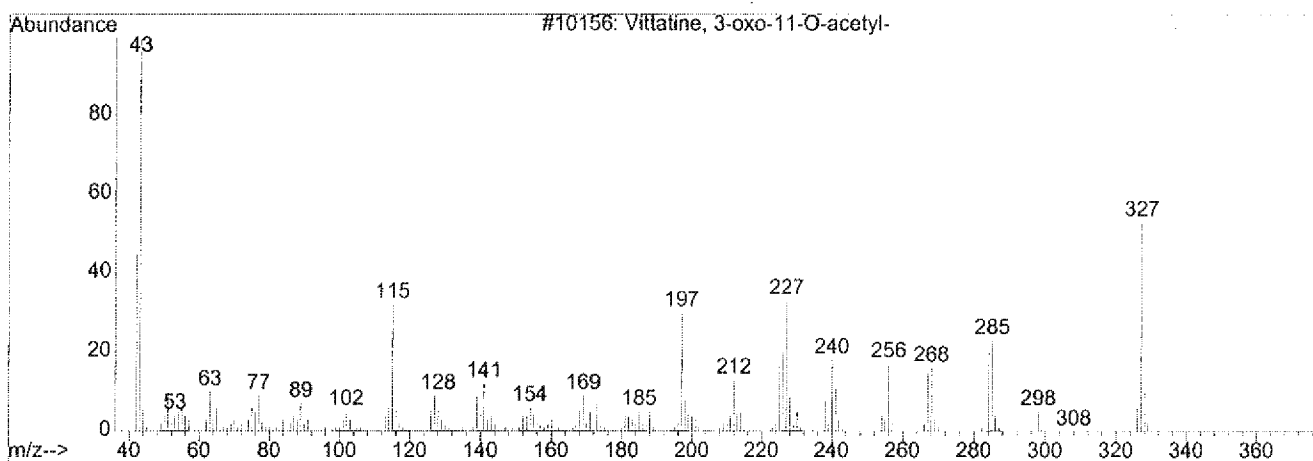
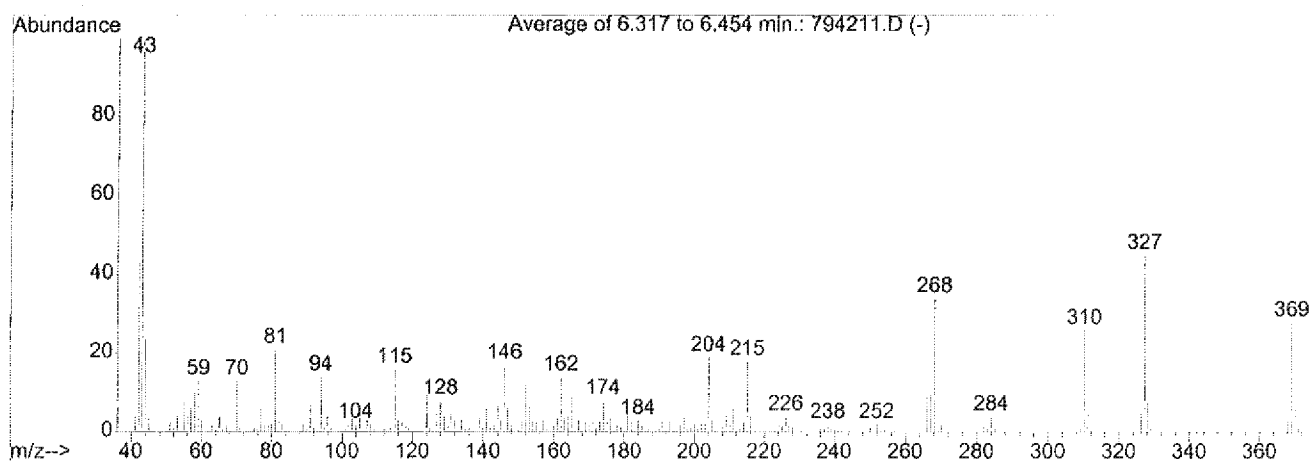
```

File Name       : F:\SYSTEM7\06_29_11\794211.D
Operator        : ASD
Date Acquired   : 29 Jun 2011   9:33
Sample Name     : ██████████
Submitted by    : DXF
Vial Number     : 11
AcquisitionMeth : DRUGS
Integrator      : RTE
  
```

```

Search Libraries: C:\DATABASE\SLI.L           Minimum Quality: 90
                  C:\DATABASE\PMW_TOX2.L      Minimum Quality: 90
                  C:\DATABASE\NIST98.L
  
```

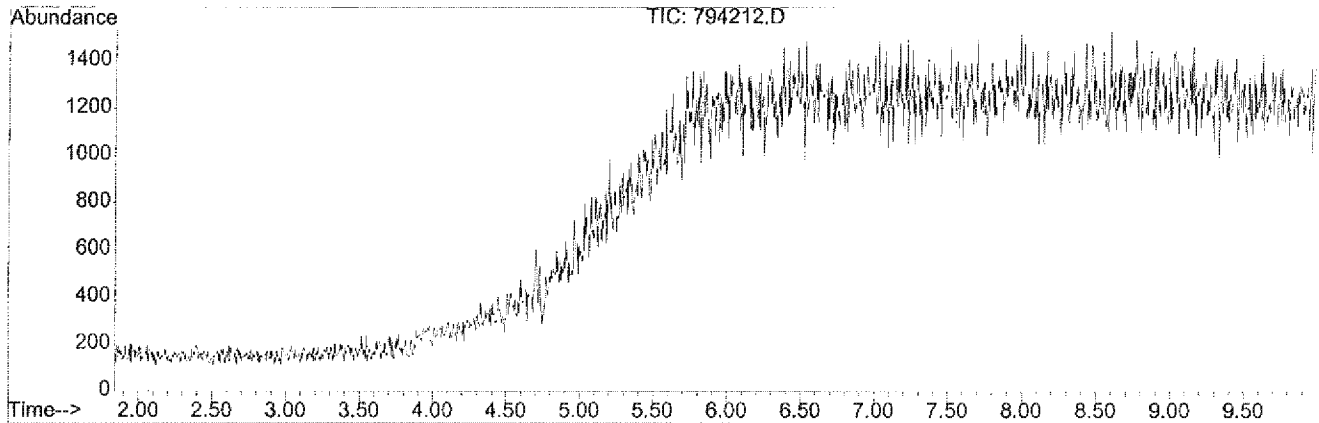
PK#	RT	Library/ID	CAS#	Qual
1	6.35	C:\DATABASE\NIST98.L		
		Vittatine, 3-oxo-11-O-acetyl-	1000111-32-8	45
		Molybdenum, ethyltris(.eta.3-2-prop	101981-45-7	10
		Morpholine, 2,6-dimethyl-	000141-91-3	9



Area Percent / Library Search Report

Information from Data File:

File Name : F:\SYSTEM7\06_29_11\794212.D
Operator : ASD
Date Acquired : 29 Jun 2011 9:45
Sample Name : BLANK
Submitted by : DXF
Vial Number : 1
AcquisitionMeth: DRUGS
Integrator : RTE



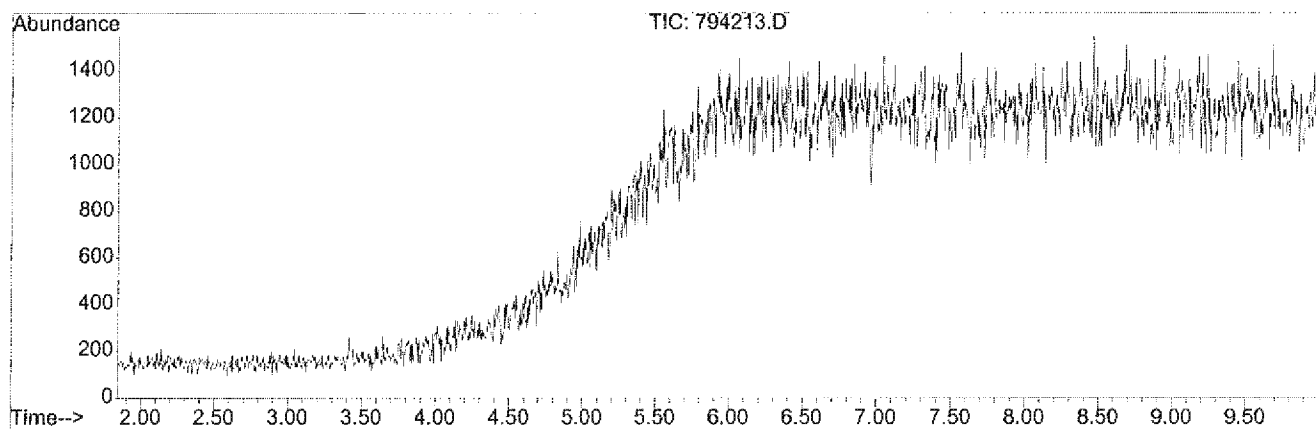
Ret. Time	Area	Area %	Ratio %
-----------	------	--------	---------

NO INTEGRATED PEAKS

Area Percent / Library Search Report

Information from Data File:

File Name : F:\SYSTEM7\06_29_11\794213.D
Operator : ASD
Date Acquired : 29 Jun 2011 9:58
Sample Name : BLANK
Submitted by : DXF
Vial Number : 1
AcquisitionMeth: DRUGS
Integrator : RTE



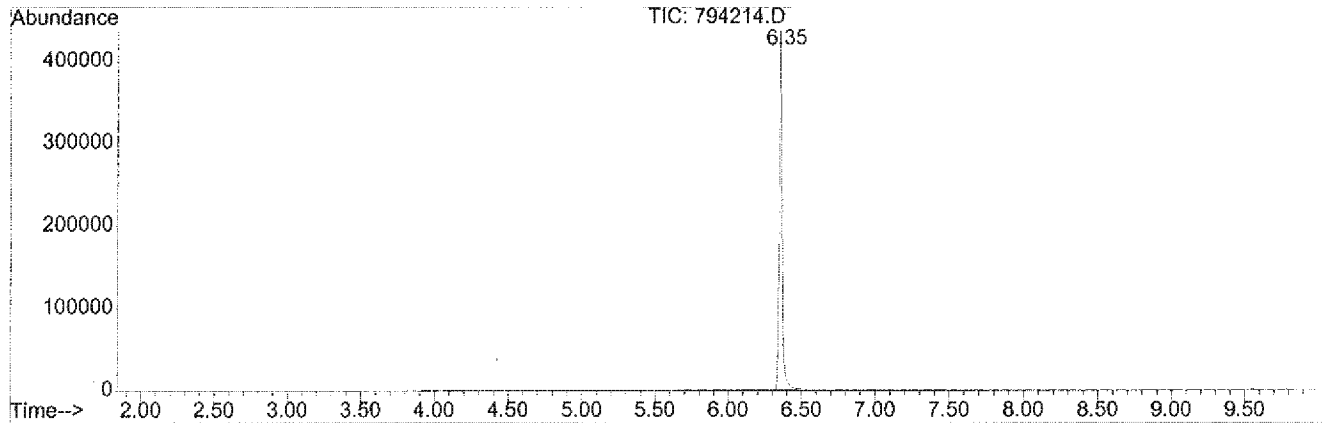
Ret. Time	Area	Area %	Ratio %
-----------	------	--------	---------

NO INTEGRATED PEAKS

Area Percent / Library Search Report

Information from Data File:

File Name : F:\SYSTEM7\06_29_11\794214.D
Operator : ASD
Date Acquired : 29 Jun 2011 10:11
Sample Name : HEROIN STD
Submitted by : DXF
Vial Number : 5
AcquisitionMeth: DRUGS
Integrator : RTE



Ret. Time	Area	Area %	Ratio %
6.354	594816	100.00	100.00

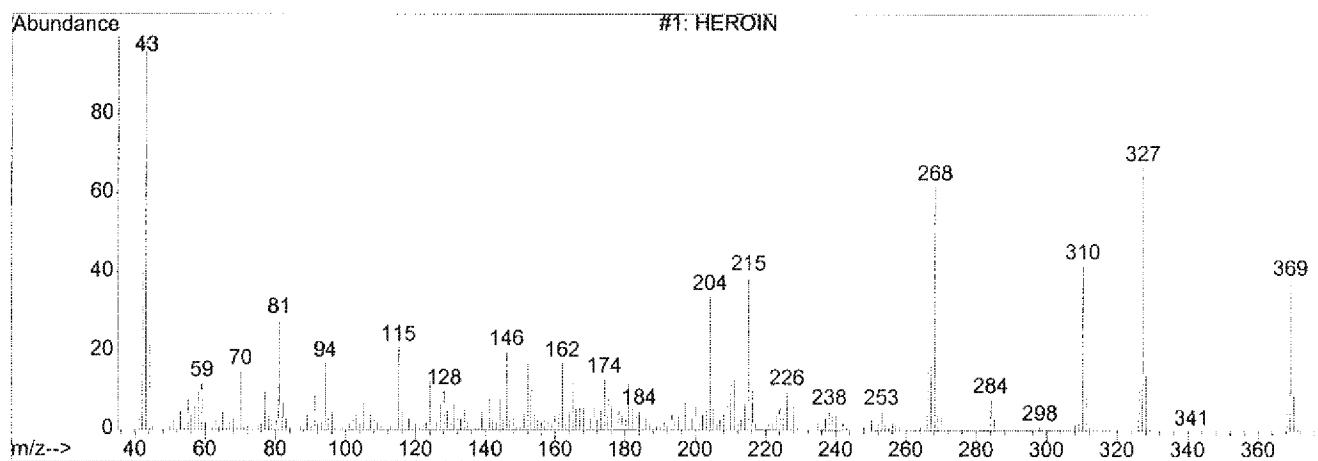
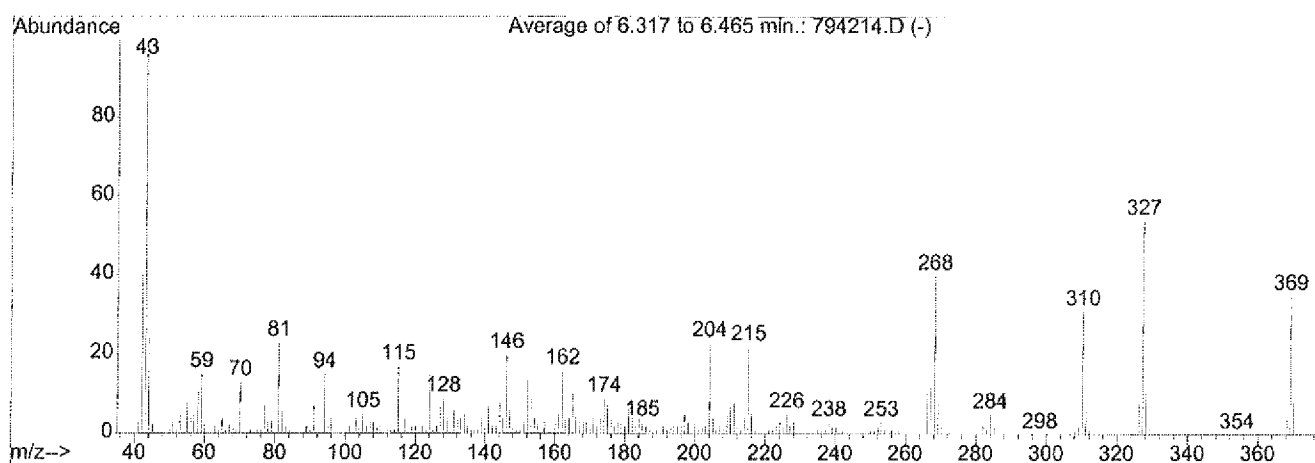
Area Percent / Library Search Report

Information from Data File:

File Name : F:\SYSTEM7\06_29_11\794214.D
 Operator : ASD
 Date Acquired : 29 Jun 2011 10:11
 Sample Name : HEROIN STD
 Submitted by : DXF
 Vial Number : 5
 AcquisitionMeth: DRUGS
 Integrator : RTE

Search Libraries: C:\DATABASE\SLI.L Minimum Quality: 90
 C:\DATABASE\PMW_TOX2.L Minimum Quality: 90
 C:\DATABASE\NIST98.L

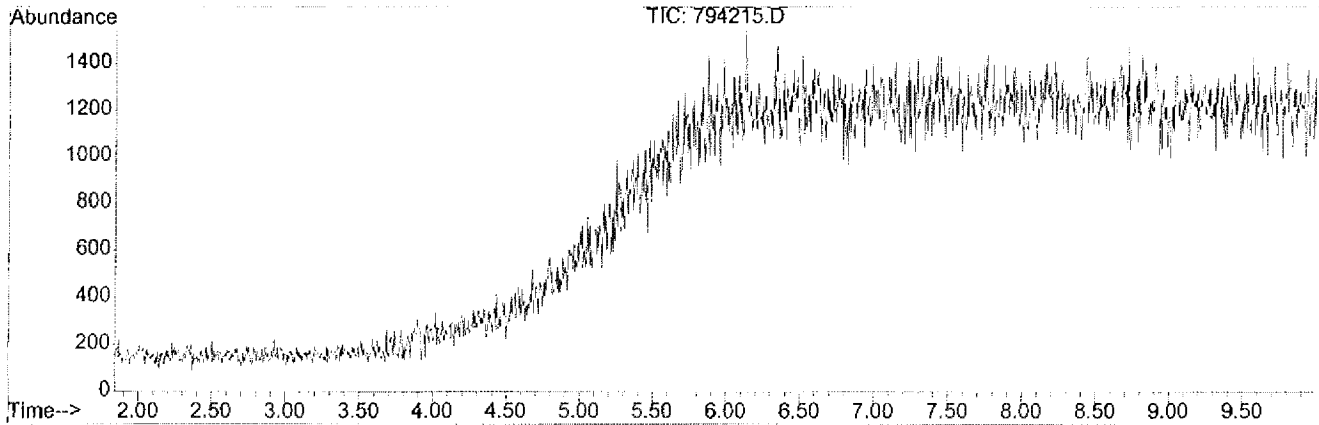
PK#	RT	Library/ID	CAS#	Qual
1	6.35	C:\DATABASE\SLI.L HEROIN	000561-27-3	99



Area Percent / Library Search Report

Information from Data File:

File Name : F:\SYSTEM7\06_29_11\794215.D
Operator : ASD
Date Acquired : 29 Jun 2011 10:23
Sample Name : BLANK
Submitted by : DXF
Vial Number : 1
AcquisitionMeth: DRUGS
Integrator : RTE



Ret. Time	Area	Area %	Ratio %
-----------	------	--------	---------

NO INTEGRATED PEAKS